

MAJOR DUTIES

Serves as Master of a derrickboat engaged in channel maintenance, marine construction, and hoisting services. Directs and is responsible for the proper maintenance, operation, administration, and safety of the vessel.

1. Supervises or directs and coordinates the activities of the crew in sweeping and probing waterways for rocks and obstructions; removing debris and wrecks; building and repairing docks, dikes, and revetments; placement and pickup of pipelines, pontoons, and anchors for mooring barge setup; driving piles; and loading equipment to and from other vessels. Works from plans or field notes showing location and extent of work to be performed. Locates area; makes necessary arrangements for accomplishing the work. Uses electronic positioning equipment for locating obstructions and for checking locations as work progresses. Places vessel in position and directs the placement of anchors and fastening of lines, the operation of deck winches, and the anchoring of the boat.
2. Prepares detailed daily and monthly reports of operations. Requisitions fuel and other supplies and equipment. Trains new employees. Conducts fire, lifeboat, and man-overboard drills. Selects personnel, maintains discipline, recommends personnel actions and schedules leave.
3. Directs or performs the operation of hoisting and swinging engines on derrickboat engaged in removing obstructions and shoals in navigation channels. The incumbent or operator moves levers controlling the raising and lowering of the boom, the horizontal movement of the boom or the horizontal movement of the cab and boom, the height of the hoisting line, and the opening and closing of the bucket attachments. Maneuvers barge by using current and spuds, by casting and pulling with boom and bucket, or by signaling pilot to maneuver the barge. Makes heavy lifts to and from docks, other vessels, and from underwater areas. Operates clamshell buckets, rock hooks, orange peels, and grapples used in digging, lifting, and depositing dredged materials (such as rocks, sand, clay and snags). Deposits materials removed on to deck of derrickboat or on dump scow. Deck loads are later removed to disposal areas. Lifts driven piling and core rock from old existing structures and drives new piling and places new core material.
4. While operating the crane, exercises caution, applies strict safety standards to avoid accidents (such as snapping hoist cables or spilling hoisted loads) and is responsible for the safety of crew members around the crane and hoisting areas. Performs routine maintenance and repair work such as replacing work on broken engine parts, valves, cables, etc., and personally makes the more difficult slings and riggings. Directs members of the crew in performing preventive maintenance and in making emergency repairs to equipment. Maintains daily progress records used in the preparation and submission of daily and weekly reports.
5. Supervises all repairs to house, hull, machinery and equipment, including major repair work on cables, sheaves, buckets, spuds, general cleaning and painting.

Performs other duties as assigned.

SKILLS AND KNOWLEDGES

--Must be able to follow oral and written instructions. Ability to read and interpret charts and to plan and plot courses to and from work locations on rivers and other waterways.

--Must have basic knowledge of navigation and a thorough knowledge of seamanship and equipment as evidence by possession of appropriate barge supervisor's license issued by the U.S. Coast Guard.

--Must have sufficient skill in boat handling to be able to operate the derrickboat safely under diverse weather, channel, traffic, and maneuvering conditions. Skill in the operation of engine and steering controls as well as the use of auxiliary equipment such as generators, winches, pumps, and other related items. Must be able to perform most routine operator-type maintenance and repairs.

RESPONSIBILITY

Incumbent receives orders or general instructions from the supervisor in charge of the work unit in terms of objectives to be achieved. Responsible for operations, maintenance, and repair of vessel and for safety of vessel and crew. Assesses weather and marine conditions and adapts operations accordingly, and assures that rules of the road and other required maritime practices are followed. Work is reviewed and evaluated in terms of the incumbent's effectiveness in the accomplishment of assignments, the maintenance and upkeep of the vessel, safety, the performance of administrative responsibilities and the direction of subordinates.

PHYSICAL EFFORT

Moderate physical effort is normally required in steering the vessel, walking, and climbing. Somewhat greater effort is required in accomplishing housekeeping and general maintenance work. Close hand and eye coordination is required when operating controls to maneuver vessel in traffic, in confined areas, and during derrick operations.

WORKING CONDITIONS

Work is performed both inside and outside aboard floating plant in all types of weather. There is danger of drowning due to accident or storm (and particularly due to improper lifting or handling of heavy objects which may cause the derrick to overturn). There is further danger of injury due to blasting operations. Is subject to cuts, bruises, sprains, and broken bones. The possibility of falling or slipping on wet or icy decks, ladders, etc., is always present. Although hazards involved are less than those of subordinate jobs because of supervisory functions, there is still exposure to unpleasant noise, heat, and fumes produced by the engine. Is exposed to dirt and grease when making minor repairs to vessel and machinery.

**MASTER, DERRICKBOAT
XH-5725-10
EVALUATION STATEMENT**

1. REFERENCES:

- a. OPM, JGS, Crane Operating, WG-5725, July 1999
- b. U.S. Army Corps of Engineers Ladder Diagram, 1953

2. SERIES AND TITLE DETERMINATION:

Subject position serves as Master of a derrickboat engaged in channel maintenance, marine construction, and hoisting services. Directs and is responsible for the proper maintenance, operation, administration, and safety of the vessel. Subject position directs and/or serves as an operator of a diesel or diesel-electric derrick or crane aboard a derrick barge or crane barge engaged in channel maintenance and hoisting services. The series that is closest to meeting describing this type of work is the Crane Operating Series, WG-5725. The series definition and the work described in the WG-5725 address land-based crane operating work. Subject position is descriptively titled Master, Derrickboat, to distinguish it from land based crane operating work and in keeping with prevailing maritime titling practices.

3. GRADE DETERMINATION:

Subject position performs the highest graded work aboard a derrickboat. In addition to operating the derrick or crane aboard the derrick barge, this position directs the crew assigned to the derrickboat. This includes directing the placement of the derrickboat in position, the placement of anchors and fastening of lines, the operation of deck winches and the anchoring of the boat, and preparing time sheets, daily work logs, inventories, etc. This position was placed on the Ladder Diagram in 1953 and paid from the supervisory pay schedule as the WS-10 level most closely matched the salaries of Derrickboat Masters at the time.

4. FINAL DETERMINATION: Master, Derrickboat, XH-5725-10

NOTES ON USING THIS BENCHMARK

If the duties, responsibilities and grade of the Master, Derrickboat, as well as the derrick barge characteristics, are significantly greater or less than this benchmark, the grade of the Master, Derrickboat may be graded higher or lower as well.